



VINETHOS.COM

YOUR GUIDE TO AMPHORAS

FOR NEW AND EXPERIENCED USERS

TABLE OF CONTENTS

Everything you need to know about amphoras:

Overview	04
Uses	05
Oxygen Transfer Rate.....	06
Skin Contact.....	07
Questions to Ask	08
Myths	10
Benefits	12

OVERVIEW

“An amphora can allow for the purest expression of your grapes and vineyard.”

In order for your wine to evolve and become its best, it needs oxygen, right? The beauty of an amphora is it allows for perfectly slow and consistent micro-oxygenation without imparting any flavors. It gives you the opportunity to discover the true character of your grapes and vineyard without any distractions.

There are two types of amphora producers: innovative/modern and traditional. Quality can vary greatly between the two. It's important to know the right questions to ask potential suppliers so you can be sure you'll get the results you're expecting.

My intent with this quick and easy guide is to provide all the information you need to make the best decisions when choosing an amphora. It will also hopefully help you if you're trying to decide whether to use an amphora at all (I vote yes!).



USES

Amphoras can be used for fermenting and aging both red and white wines. They can benefit any type of wine, not just "natural wines." The use of clay as the material is based on some specific characteristics.

MICRO-OXYGENATION

One of the most significant functions of the amphora is the ability to allow a natural flow of oxygen to the wine. The micro-oxygenation level of an amphora can be similar to that of a new barrel, except there are no organoleptic changes in the wine. Amphoras preserve the natural properties of the grape and support oenological development.

THERMAL INERTIA

The thermal qualities of clay have been renowned for centuries. The specific ability of clay to protect wine from thermal shocks has made its use popular worldwide. Clay amphoras, even more than cement, provide protection and uniformity in regulating the temperature of oenological products.

OXYGEN TRANSFER RATE

THE KEY TO FRESH WINES

“Amphoras can help you make high-quality, fresh wines. But working with an innovative producer is key.”

An amphora can supply a similar level of micro-oxygenation as a new barrel, but with more consistency. With wood, 50% of the annual oxygen transfer is released in the first 2-4 months and then slows down.

With an amphora, micro-oxygenation is more linear and stable throughout the year. When well maintained, an amphora will provide a roughly similar level of micro-oxygenation year after year for its entire lifetime. And great news, amphoras never have to be replaced!

Working with innovative producers is key - those that fire the amphoras at very high temperatures (above 1900 °F), which allows for precise control over porosity and, hence, the level of micro-oxygenation. This is a new technique that has drastically improved the quality of amphoras.

SKIN CONTACT

Amphoras can be one of the safest and cleanest vessels for making wine, so you have incredible freedom to experiment with extended skin contact or minimizing sulfur use.

Many people shy away from extended skin contact, and not all grape varieties benefit from it. But under the right conditions, you can be rewarded with a truly outstanding result.

- 1) You get to extract all the characters, flavors and properties in the skins that would normally be missed, making for a more complex wine.
- 2) Grape skins are full of anti-oxidants. With 2-10 months of skin contact, it's possible to minimize or eliminate the use of sulfur. The powerful oxygen-fighting properties protect the wine for its lifetime, even for days after the bottle's open.

The shape of some amphoras, such as those shown in this guide, provides the ideal ratio of skin to juice contact. Post-fermentation, the skins will hang out at the smallest part of the vessel, at the top. This provides a similar ratio to a like-sized barrel.

High-quality amphoras are clean, microbial-free and exchange just the right amount of oxygen. They provide an ideal, healthy environment for going natural.



QUESTIONS TO ASK

AS WITH BARRELS OR ANY VESSEL IN WHICH YOU AGE WINE, YOU WANT TO KNOW ABOUT THE RISK OF CONTAMINATION.

Lesser quality amphora producers may sell you a vessel made with the same material and under the same production process and fire temperature as a vessel used for flower pots. THIS IS NOT OKAY.

Make sure your amphoras are specifically made for wine and have been tested and certified to ensure they meet the minimum food-safety requirements.

Amphoras fired at very high temperatures (above 1900 °F) will be the safest, as this maintains the integrity of the materials and minimizes migration to the wine.

Below are some guidelines on the levels of cadmium and lead that are acceptable for products in contact with food and wine. The levels can vary greatly from one amphora to another, and not all producers can provide you with detailed and reliable tests to support their statement of conformity. You do not want to compromise on this one.

	CALIFORNIA (PROPOSITION 65) mg/l		U.S.FDA (MG/L)	
	Lead	Cadmium	Lead	Cadmium
Dishes	0,226	0,05	3,0	0,05
Cups and mugs	0,100	0,05	0,5	0,05
Small vases	0,100	0,05	2,0	0,05
Big vases	0,100	0,25	1,0	0,25
Terracotta pitchers	0,100	0,25	0,5	0,25

THE MATERIALS - CLAY

QUESTIONS TO ASK

“Clay is the preferred material for wine because it's more pure and allows for better control over porosity than other materials.”

You don't need to know the exact recipe of the clay mixture or specific town from which it came, but there are some questions you should ask potential suppliers.

- 1) Is it actually clay? Other materials, such as sandstone, can be made to look like clay.
- 2) Is the clay mixture particularly suited for wine?
- 3) Is it sourced somewhat close to producer? HINT: if the materials come from China, that's a red flag.

Colors and stabilizers could potentially be bad for your wine – there hasn't been enough testing to know. If all of a producer's amphoras look homogenous – same color, same smooth texture, etc. – colors and stabilizers have been used.

It's better to be less particular about outer appearance of your amphora and know your wine is safe.

MYTHS

One of the most common myths is that amphoras are only used for making natural wines. Not true! Most wineries use amphoras because they want a pure expression of fruit. Amphoras benefit any type of wine.

TOO MUCH OXYGEN

A high-quality amphora made by an innovative producer can provide the same amount of oxygen as a new barrel, and sometimes less if requested. But it is important the amphora is fired at very high temperatures to be able to limit the size of the pores and therefore the oxygen coming in.

COATING IS NECESSARY

Some producers will line the inside of their amphoras with a coating of beeswax to prevent the migration of materials to the wine. If the amphoras are fired at very high temperatures, coating is not necessary. High-temperature firing, combined with the right clay mixture, prevents migration of materials that might alter the chemistry of the wine or potentially be unsafe.

MYTHS CONT'D

PRONE TO CRACKS AND LEAKS

Not if they are made well. Get references from other clients for your supplier so you can be sure it has a good track record. Also find out about the supplier's responsiveness in case you do need something fixed.

IMPARTS FLAVOR ON THE WINES

When amphoras are fired at very high temperatures, the vessel is neutral. It might bring out certain characteristics of the wine that don't show up in barrels, but flavors aren't coming from the amphora itself. It's just a different expression of the wine.

HARD TO CLEAN

Actually, they can be easier and more sanitary than barrels. The more barrels are used, the more prone they are to microbial contamination.

With high-quality amphoras, the wine only penetrates 1-2 mm, so it's easy to clean and stays clean over time.

It's even possible to put red wine in the amphora, clean it, and then fill it with white wine.

Ask your supplier about the recommended procedures for cleaning the amphora 1) before the first use, and 2) for subsequent cleanings.

BENEFITS OF AMPHORAS

NATURAL MICRO-OXYGENATION

There's no need for an extra device to provide oxygen (vs. tanks).

NO FLAVORS IMPARTED

An amphora is a neutral vessel, which allows for fruit purity.

THERMO-REGULATION

Clay amphoras, even more than cement, regulate wine temperature.

SUSTAINABILITY

Amphoras don't need to be replaced, ever. Also, using clay doesn't burden natural resources.

COST SAVINGS

No need to replace as you would with barrels. You can also save in labor costs with less frequent toppings and maintenance.

ENHANCES FRESHNESS

Amphoras fired at higher temperatures can preserve acidity in wine. They also don't weigh a wine down with sweet or toasty flavors.

MARKETING TOOL

Sustainability, uniqueness, cool factor, expression of terroir – all things that get the attention of millennials and other young wine drinkers.

CLEAN AND SANITARY

High-temperature-fired amphoras are easy to clean, as the wine only penetrates 1-2mm.

FLEXIBILITY

Once cleaned, an amphora can be used for white wine after it's been used for red wine.